

A multigrid method for weakly nonlinear elliptic equations of the second order

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Abstract

We consider the Dirichlet problem for a weakly nonlinear elliptic equation of the second order in the divergence form. We prove the convergence of a multigrid method for solving this problem. The method under consideration is based on the application of conformal finite elements and the Jacobi smoothing procedure. © 2011 Allerton Press, Inc.

<http://dx.doi.org/10.3103/S1066369X11030029>

Keywords

finite element method, multigrid iteration method, weakly nonlinear elliptic equation